

AMENDMENTS TO THE CLAIMS:

The listing of claims will replace all prior versions, and listings of claims in the application:

LISTING OF CLAIMS:

1. (Canceled)
2. (Canceled)
3. (Canceled)
4. (Canceled)
5. (Canceled)
6. (Canceled)
7. (Canceled)
8. (Canceled)
9. (Currently Amended) The method of outputting a digital color image as set forth in claim 7~~14~~, further comprising outputting data comprising the intermediate components and the output black component.
10. (Canceled)
11. (Currently Amended) The method of outputting a digital color image as set forth in claim 4~~0~~~~12~~, where the applying a different process to the intermediate components comprises minimizing CMY values.

12. (Currently Amended) In an image output terminal, a ~~The method of outputting a digital color image as set forth in claim 10, comprising:~~

converting input components corresponding to a color in a first color space to intermediate components in a second color space, where the second color space includes at least one intermediate component that is different from the input components; and,

deriving an output black component from both the intermediate components and the input components, wherein said deriving includes:

applying a defined process to the input components;

applying a different process to the intermediate components; and,

combining the processed input components and the differently processed intermediate components;

wherein ~~where~~ the first color space includes HSV and the applying a defined process comprises applying a function including H, S and V, where the function is different depending on the position of an S value with respect to a threshold.

13. (Currently Amended) In an image output terminal, a ~~The method of outputting a digital color image as set forth in claim 10, comprising:~~

converting input components corresponding to a color in a first color space to intermediate components in a second color space, where the second color space includes at least one intermediate component that is different from the input components; and,

deriving an output black component from both the intermediate components and the input components, wherein said deriving includes:

applying a defined process to the input components;

applying a different process to the intermediate components; and,

combining the processed input components and the differently processed intermediate components;

wherein ~~where~~ the first color space includes HSV and the applying a defined process comprises applying a function including H, S and V, where the function is different depending on the position of a V value with respect to a threshold.

14. (Currently Amended) In an image output terminal, a ~~The method of outputting a digital color image as set forth in claim 7, comprising:~~

converting input components corresponding to a color in a first color space to intermediate components in a second color space, where the second color space includes at least one intermediate component that is different from the input components; and

deriving an output black component from both the intermediate components and the input components;

wherein ~~where~~ the first color space comprises HSV and the deriving comprises:

applying a function to the intermediate components; and

for input components including V below a V threshold and S below an S threshold, applying a function varying with V and the V threshold.

15. (Canceled)

16. (Original) The system as set forth in claim 14, where the input color space is defined in HSV and the functions include a first function $g(H,S,V)$, and a second function h depending on the intermediate color separation, the system further comprising a calculator which calculates $g(H,S,V)$ by implementing the equation:

$$g(H,S,V) = 1 - \begin{cases} a_H S^2 + b_H S + c_H & \text{for } S > S_t \text{ and } V > V_t \\ 1 - \left(1 - \frac{V}{V_t}\right)^2 & \text{for } S \leq S_t \text{ and } V < V_t \\ \left(a_H S^2 + b_H S + c_H\right) \left[1 - \left(1 - \frac{V}{V_t}\right)^2\right] & \text{for } S > S_t \text{ and } V < V_t \\ 1 & \text{for } S \leq S_t \text{ and } V > V_t \end{cases}$$

where coefficients a_H , b_H and c_H are different functions of hue angle, and S_t and V_t are threshold values for saturation and value, respectively.

17. (Original) The system as set forth in claim 14, where the intermediate color separations are defined in CMY.

18. (Original) The system as set forth in claim 14, further comprising a post-processor that adjusts the intermediate color separations based on the calculated achromatic color separation.